Specific Guidance for Providing Pollutant Load Reduction Information

September 29, 2004

This guidance provides assistance to applicants who are preparing proposals in response to the AWQGP & Clean Water Act (CWA) Section 319 Solicitation Notice (September 8, 2004). It specifically addresses the requirement as specified in the AWQGP Guidelines (August 2004) that all implementation projects that propose pollution load and/or concentration reductions must report annual pollutant load reductions based on either monitoring or estimations.

Background

The State Water Resources Control Board (State Board) is requiring all applicants to report on water quality benefits achieved by implementation projects. Applicants that are awarded funds will be required to detail the methods of measuring project benefits and reporting them in accordance with a *Project Assessment and Evaluation Plan*. Many projects include multiple activities that will require measurement of several parameters to evaluate project performance. Parameters to be measured may include pollutant loads and/or concentrations, area of habitat restoration, or river miles protected. This guidance specifically addresses calculation and reporting of pollution load and/or concentration reduction {e.g., projects that implement Best Management Practices (BMP) to reduce pesticides in a water body}.

The purpose for requiring measurement of pollutant load reductions and other measures of project performance include:

- Better documentation of project success in terms of quantified environmental results;
- Encouraging projects to focus more on achieving measurable water quality improvements, particularly those consistent with TMDLs and watershed plans; and
- Developing more information concerning the effectiveness of various pollution control practices to assist with future implementation.

Please note that the details of a *Project Assessment and Evaluation Plan* are not required in the application submittal, only a discussion of how assessment and evaluation of pollutant load and reduction would be achieved. Guidance for preparing the *Project Assessment and Evaluation Plan* and specific guidance for other types of project measures is currently under development and will be available at the website http://www.swrcb.ca.gov/funding/awqgp/index.html. You may also contact Steven Rodriguez, SWRCB staff, at (916) 324-9944 if you need assistance with developing the assessment and evaluation of project activities.

Reporting Pollutant Load Reductions

All implementation projects designed to achieve pollution load and/or concentration reductions must:

- **Provide initial figures**. Provide an initial calculation of the annualized pollution load and/or concentration reduction that is anticipated to be achieved when the project is fully functioning. It is recommended that this be included in the "Project Description" portion of the proposal, and <u>must</u> be included and discussed in the *Project Assessment and Evaluation Plan* that all funded projects will be required to prepare.
- Provide refined figures during project. During the grant funding project period, report
 annually on any refinements in load reduction calculations based on further information.
 This recognizes that pollution reduction activities (e.g., BMP installation) for a given
 project sometimes change between the project proposal stage and the implementation
 stage, and that further monitoring and assessment may result in more accurate
 information.
- **Provide final figures at project conclusion**. At the conclusion of the grant funding project period, the final project report must indicate the pollutant load reductions achieved. The report must also include an estimate of the annualized pollutant load reduction that will be achieved during the anticipated lifetime of the implemented pollution control measures (e.g., 5 years, 10 years, etc.).

Load reductions should be reported in consistent units. Any load reduction information reported must include appropriate explanations as to how the figures were developed and tabulated. If modeling is used, the name of the model used should also be reported.

Calculating Annual Load Reductions

Load reduction calculation methodologies should be included in the "Project Description" portion of the proposal, and <u>must</u> be included and discussed in the *Project Assessment and Evaluation Plan* that all funded implementation projects will be required to prepare. Proposed calculations and estimates will be reviewed for technical and statistical content.

There are challenges and limitations in measuring and estimating annual pollutant load reductions. Applicants must provide appropriate explanations about the accuracy of the load reduction figures. Examples of such explanations include:

- A description of the limitations of a particular model;
- Inclusion of confidence statistics on the calculated load reduction; and
- A discussion of the reasons that diversion measurements, rather than waterbody measurements, are used for the calculations.

We anticipate that grantees will work with project partners and Regional Water Quality Control Board (Regional Board) staff to identify the appropriate methods for calculating load reductions. The U.S. EPA has made two relatively simple models available that can provide an estimate of sediment and nutrient load reductions that are available online at http://it.tetratech-ffx.com/stepl/

Exceptions

For certain types of projects, load reduction information may not be relevant and thus would not be required. Load reductions will not be required under the following conditions:

- Project Planning Monitoring projects, or
- Certain impairments where load reductions are not applicable such as temperature and unknown toxicity.

Be sure to consult with a Regional Board contact if you think that your project should not be required to report annual pollutant load reductions.

Other Project Parameters

In addition to calculating load reductions for projects designed to reduce pollution loads, it is also critical to account for the successful implementation of other key practices that not only reduce loads, but also protect the biological and physical characteristics of water bodies. For example it may be appropriate to report on the following parameters, if relevant to the project, to fully evaluate the effectiveness of that project:

- Wetlands restored (acres)
- Wetlands created (acres)
- Streambank and Shoreline Protection (feet)
- Stream Channel Stabilization (feet)

These and other relevant parameters must be discussed in the *Project Assessment and Evaluation Plan* along with the load estimates, as appropriate.

Conclusion

All implementation projects that propose pollution load and/or concentration reductions must report annual pollutant load reductions as described above. It is recommended that an initial load reduction estimate be included in the "Project Description" portion of the proposal. As applicable, pollutant load reductions <u>must</u> be addressed in the *Project Assessment and Evaluation Plan* that all funded implementation projects will be required to prepare. In addition, other appropriate parameters must also be addressed in the *Project Assessment and Evaluation Plan*. Guidance on preparing *Project Assessment and Evaluation Plan* is under development and will be available at http://www.swrcb.ca.gov/funding/awqgp/index.html.